EAST SEARCH	CH HISTORY		
HITS	QUERY	DATABASE	
67	67 (eye adj (position or locat\$)) and (mouth adj (position or locat\$))	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	
a	2 ("6072892").PN.	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	
N	2 ("6151403").PN.	USPAT, US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	
8	2 ("6262574").PN.	USPAT, US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	
8	2 ("6292574"). PN.	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	
26	26 ((integral or histogram) adj project\$5) and (eye and mouth)	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	
22	22 (histogram NEAR3 equali\$6) and (eye and mouth)	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	
-	11 (bayes\$ with (classif\$6 or cluster&4)) and (eye and mouth)	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	
259	259 (aspect adj ratio) and eye and USPAT; US-PGPUB; 382.clas. IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	
250	250 (aspect adj ratio) and eye and USPAT; US-PGPUB; 382.clas. and (detect\$6 or EPO; JPO; DERWEN locat\$6 or track\$5)	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	
12	12 ((aspect adj ratio) with eye) USPAT, US-PGPUB; and 382 clas. and (detect\$6 or EPO; JPO; DERWENT; locat\$6 or track\$5) IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	
2	2 6044168.pn.	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	

A 22-6

6181805 USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB
6 6181805	5 (aspect adj ratio) and eye and USPAT; US-PGPUB; 382.clas. and (detect\$6 or locat\$6 or track\$5) and lBM_TDB kinjo.in.	1 (aspect adj ratio) and eye and 382.clas. and (detect\$6 or locat\$6 or track\$5) and naris	14 (bayes\$ same (classif\$6 or cluster&4)) and (eye and mouth)	85 (bayes\$ with (classif\$6 or cluster&4)) and (eye)	41 (bayes\$ with (classif\$6 or cluster&4)) and (eye) and (382.clas. or 345.clas.)	43 (bayes\$ with (classif\$6 or cluster&4)) and (eye or iris or naris or nares) and (382.clas. or 345.clas.)	27 (bayes\$ with (classif\$6 or Cluster&4)) and (eye or iris or Elnaris or nares) and (382.clas. IB or 345.clas.) and (not mammo\$7)

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USPAT; US-PGPUB																							
27 (US-5761070-\$ or US- US- US- S412738-\$ or US-5412563-\$	or US-5187658-\$ or US-	5181259-\$ or US-4868883-\$	or US-6034697-\$ or US-	6021383-\$ or US-5930803-\$	or US-5861891-\$ or US-	5850470-\$).did. or (US-	20040056907-\$ or US-	20040008867-\$ or US-	20030021448-\$ or US-	20030016846-\$ or US-	20020186882-\$ or US-	20020159627-\$ or US-	20020114495-\$ or US-	20020106112-\$ or US-	20030133599-\$ or US-	20030128877-\$ or US-	20030103665-\$ or US-	20030086593-\$ or US-	20030063779-\$ or US-	20030059090-\$ or US-	20030053663-\$ or US-	20030030637-\$).did.	
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Ë E	i. Z
USPAT; US-PGPUB; EPO; JPO; DERWEN IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB
	JS-P(
USPAT; US	USPAT; U
(bayes\$ with (classif\$6 or luspAT; US-PGPUB; cluster&4)) and (iris or naris or EPO; JPO; DERWENT; nares) and (382.clas. or left); JPO; DERWENT; nares) and (382.clas. or left); JPO; DERWENT; nares) and (105-5761070-\$ 345.clas.) and (105-5761070-\$ 5 or US-5187658-\$ or US-5412738-\$ or US-581825-\$ or US-58003-\$ or US-5861891-\$ or US-5860470-\$).did. or (US-5860470-\$).did. or (US-5860470-\$).did. or (US-580001686-\$ or US-500001686-\$ or US-500011449-\$ or US-500011449-\$ or US-500011449-\$ or US-500011686-\$ or US-500001686-\$ or US-500000659-\$ or US-5000000659-\$ or US-500000659-\$ or US-500000659-\$ or US-500000659-\$ or US-500000659-\$ or US-500000659-\$ or US-500000659-\$ or US-5000006	USP EPC IBM
nris or 7.5 % % % % % % % % % % % % % % % % % % %	clas.
(bayes\$ with (classif\$6 or cluster&4)) and (iris or naris or naries) and (382.clas. or 345.clas.) and (105-5761070 \$ 45.clas.) and (105-5761070 \$ or US-5412738-\$ or US-5412563-\$ or US-5412738-\$ or US-541259-\$ or US-6034697-\$ or US-6021383-\$ or US-6034697-\$ or US-6021383-\$ or US-5861891-\$ or US-5860470-\$).did. or (US-20030018867-\$ or US-200301448-\$ or US-2003014495-\$ or US-2003013599-\$ or US-2003013599-\$ or US-2003013599-\$ or US-2003013599-\$ or US-2003013599-\$ or US-20030063779-\$ or US-20030053663-\$ or US-20030050505-\$ or	(((bottom or lower) with (section or half or halves)) same ((upper or top) same (section or half or halves))) and (face or eye or iris or nares or naris) and (382 clas. or 345 clas.)
10.0.5.0	wer) wer) v for his or his or his e or i and (
with ((38)) and (38)) and (38)) and (38)) and (38) and (3	or lov
(bayes\$ with (classif& cluster&4)) and (iris or nares) and (382.clas. days.clas. days.clas. and (10.5-57 at Clas.) and (10.5-51 at Clas.)	titom of (up of
(bayes\$ with (classif\$6 or cluster&4) and (iis or naris or cluster&4) and (iis or naris or lares) and (382,clas. or \$45,clas.) and (US-5761070-\$ or US-5187658-\$ or US-5187658-\$ or US-5187658-\$ or US-5187659-\$ or US-6034697-\$ or US-6031383-\$ or US-6034697-\$ or US-6031383-\$ or US-5861891-\$ or US-586470-\$).did. or (US-20040008867-\$ or US-2003001448-\$ or US-2003001448-\$ or US-200300112-\$ or US-20030112-\$ or US-2003013599-\$ or US-20030138877-\$ or US-2003013665-\$ or US-2003005309-\$ or US-200300530637-\$).did.)	((bottom or lower) with (section or half or halve same ((upper or top) sa (section or half or halve and (face or eye or iris or nares or naris) and (385 or 345 clas.)
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PGPL	PGPU	PGPU	PGPU	PGPU	PGPU	PGPU ERW	GPU	GPU
-SU ; D :09B	PO: D	US-1 0 0 0	1.0S-1.09.00	0.00 0.00 0.00	- NS-F - Oc. D - DB	1.00 0.00 1.00	US-F	US-F O; D
USPAT, US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT, US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT, US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT, US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT, US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB
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h (halper or ves))) s or 82.cla	h (hal ber or ves))) ris or 82.cla	l) san	ir and irides 5.clas	r and irides 5.clas	ne or 82.cla	or or 82.cla	and (e s) and s.)	ind (e) s) and s.)
(((bottom or lower) with (half or halves)) same ((upper or top) same (half or halves))) and (face or eye or iris or nares or naris) and (382.clas or 345.clas.)	(((bottom or lower) with (half or halves)) same ((upper or top) same (half or halves))) same (face or eye or iris or nares or naris) and (382.clas, or 345.clas.)	adj many adj pixel) same ter and (eye or iris or s or irides)	is\$5)) same cluster and or iris or irises or irides) (382.clas. and 345.clas.)	is\$5) same cluster and or iris or irises or irides) (382.clas. and 345.clas.)	or iris	xel) s; or iris nd (3;	el) same cluster) and s or irises or irides) a clas. and 345.clas.)	ster) a irides 45.cla
same same (half or or eye aris) a	same same (half of or e) aris) a	any ac l (eye des)	or iris	ame or iris las. at	Jj pixe (eye des) a	ear pi) (eye des) a	ses or	e clus ses or and 34
(((bottom or or halves)) s top) same (h and (face or nares or nari or 345.clas.)	(((bottom or or halves)) so or halves)) so top) same (face or naries or naries or 345.clas.)	(too adj many cluster and (ey irises or irides)	\$\$51) s or iris 382.c	\$5) s or iris 382.c	nber adj p ter and (e) s or irides 345.clas.)	itity ne sr and or iric	l) san or iris clas. a	sam or iris clas. a
771 (((bottom or lower) with (half or halves)) same ((upper or top) same (half or halves))) and (face or eye or iris or nares or naris) and (382.clas) or 345.clas.)	104 (((bottom or lower) with (half or halves)) same ((upper or top) same (half or halves))) same (face or eye or iris or nares or naris) and (382.clas.) or 345.clas.)	0 (too adj many adj pixel) s cluster and (eye or iris or irises or irides)	0 (dens\$51) same cluster and (eye or iris or irises or irides) and (382.clas. and 345.clas.)	0 (dens\$5) same cluster and (eye or iris or irises or irides) and (382.clas. and 345.clas.)	1 (number adj pixel) same cluster and (eye or iris or irises or irides) and (382.clas, and 345.clas.)	ol (quantity near pixel) same cluster and (eye or iris or irises or irides) and (382.clas. and 345.clas.)	O((sizel) same cluster) and (eye USPAT; US-PGPUB; or iris or irises or irides) and EPO; JPO; DERWEN (382.clas. and 345.clas.)	3 ((size) same cluster) and (eye or iris or irises or irides) and (382.clas. and 345.clas.)
177	104	0	0	0		0	0	6

USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	169 ((size) same (cluster or blob) same (remove\$2 or invalid\$6 or filter\$5 or delet\$5)) and image and (382.clas. or 345.clas.)
USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	585 ((size) same (cluster or blob) same (remove\$2 or invalid\$6 or filter\$5 or delet\$5)) and image
USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	638 ((size) same (cluster or blob) same pixel) and image
USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	15 ((maximum adj size) same (cluster or blob) same pixel) and image
USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	68 (maximum adj size) same (cluster or blob) and image
USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	3 (maximum adj size) same (cluster or blob) and image and eye
USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	4 (maximum adj (size or number) near (cluster or blob) and image and eye
USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	107 (maximum adj (size or number)) near (cluster or blob)
USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	1 (blob near size) and (eye or iris or irises or irides) and (382.clas. and 345.clas.)
USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	0 (cluster near size) and (eye or iris or irises or irides) and (382.clas. and 345.clas.)
USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	10 (number adj pixel) same (eye or iris or irises or irides) and (382.clas. and 345.clas.)

USPAT; US-PGPUB	
169 (US-6668078-\$ or US-6687395-\$ or US-61701005-\$ or US-6707940-\$ or US-6122405-\$ or US-6122405-\$ or US-61274898-\$ or US-6167746-\$ or US-6188405-\$ or US-6205236-\$ or US-6208749-\$ or US-6208749-\$ or US-6208749-\$ or US-6249604-\$ or US-6289194-\$ or US-6301386-\$ or US-6249604-\$ or US-6301386-\$ or US-634298-\$ or US-634298-\$ or US-634298-\$ or US-634212-\$ or US-634212-\$ or US-641122-\$ or US-651122-\$	or US-6330696-\$ or US-656699-\$ or US-656699-\$ or US-66574377-\$ or US-6603491-\$ or US-6650766-\$ or US-6652959-\$ or US-665783-\$ or US-6081612-\$ or US-6091841-\$ or US-6115488-\$ or US-6122397-\$ or US-6064384-\$). did. or (US-6064384-\$). did. or (US-6483603-\$ or US-5491760-\$ or US-5557689-\$ or US-

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	IBM_IDB					-			-											· · · · · · · · · · · · · · · · · · ·																
size) same (cluster or blob)	((US-6668078-\$ or US-	6687395-\$ or US-6701005-\$	or US-6707940-\$ or US-	6122405-\$ or US-6137898-\$	or US-6167146-\$ or US-	6181837-\$ or US-6188405-\$	or US-6205236-\$ or US-	6208749-\$ or US-6236663-\$	or US-6246784-\$ or US-	6249604-\$ or US-6269194-\$	or US-6301386-\$ or US-	6324298-\$ or US-6340980-\$	or US-6345112-\$ or US-	6351273-\$ or US-6353450-\$	or US-6363162-\$ or US-	6389157-\$ or US-6393134-\$	or US-6407757-\$ or US-	6421064-\$).did. or (US-	6421122-\$ or US-6434261-\$	or US-6438261-\$ or US-	6473524-\$ or US-6480279-\$	or US-6493082-\$ or US-	6504546-\$ or US-6507670-\$	or US-6525732-\$ or US-	6532302-\$ or US-6549646-\$	or US-6556696-\$ or US-	5556699-\$ or US-6574377-\$	or US-6603491-\$ or US-	5640015-\$ or US-6650766-\$	or US-6652959-\$ or US-	5658143-\$ or US-6667783-\$	or US-6081612-\$ or US-	5088018-\$ or US-6091841-\$	or US-6111975-\$ or US-	5115488-\$ or US-6122397-\$	or US-6064384-\$).did. or (US-
169 ((s				<u> </u>	<u>J</u>	<u></u>		9	3	9	Ģ	9		9		9		9	w	<u>0</u>	w	0	ω	0	9	0	<u> </u>	0	9	•	9	0	9	0	9	0

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USPAT, US-PGPUB; EPO; JPO; DERWENT;	IBM_TDB																																		USPAT; US-PGPUB;
r blob) alid\$6	or filter\$5 or delet\$5)) and ((US-6668078-\$ or US-	6687395-\$ or US-6701005-\$	or US-6707940-\$ or US-	6122405-\$ or US-6137898-\$	or US-6167146-\$ or US-	6181837-\$ or US-6188405-\$	or US-6205236-\$ or US-	6208749-\$ or US-6236663-\$	or US-6246/84-\$ or US-	6249604-\$ or US-6269194-\$	or US-6301386-\$ or US-	6324298-\$ or US-6340980-\$	or US-6345112-\$ or US-	6351273-\$ or US-6353450-\$	or US-6363162-\$ or US-	6389157-\$ or US-6393134-\$	or US-6407757-\$ or US-	6421064-\$).did. or (US-	or US-6438261-\$ or US-	6473524-\$ or US-6480279-\$	or US-6493082-\$ or US-	6504546-\$ or US-6507670-\$	or US-6525732-\$ or US-	6532302-\$ or US-6549646-\$	6556699-\$ or 115-6574377-\$	or US-6603491-\$ or US-	6640015-\$ or US-6650766-\$	or US-6652959-\$ or US-	6658143-\$ or US-6667783-\$	or US-6081612-\$ or US-	6088018-\$ or US-6091841-\$	or US-6111975-\$ or US-	6115488-\$ or US-6122397-\$	or US-6064384-\$).did. or (US-	

 USPAT; US-PGPUB; EPO; JPO; DERWENT;	116 ((cluster or blob) adj size) and (lipidal) pixel and (382.clas. or
G-10-0-0-0-0-0-0-0-0-0-0-0-0-0-0-0-0-0-0	
 _	6115488-\$ or US-6122397-\$
	or US-6111975-\$ or US-
	or US-6081612-\$ or US-6088018-\$ or US-
	6658143-\$ or US-6667783-\$
 ·	or US-6652959-\$ or US-
	6640015-\$ or US-6650766-\$
	or US-6603491-\$ or US-
	6556699-\$ or US-6574377-\$
	or US-6556696-\$ or US-
	6532302-\$ or US-6549646-\$
	or 11S-6525732-\$ or 11S-
	6504546-\$ or US-6507670-\$
	04/ 3324-\$ 01 03-0480Z/ 9-\$
	or US-6438261-\$ or US-6438224-\$ or US-
	04Z11ZZ-\$ OF US-6434Z61-\$
	6421064-\$).did. or (US-
	or US-6407757-\$ or US-
	6389157-\$ or US-6393134-\$
	or US-6363162-\$ or US-
	6351273-\$ or US-6353450-\$
	or US-6345112-\$ or US-
	01 US-6301380-\$ 01 US- 6324298-\$ 01 US-6340980-\$
	6249604-\$ or US-6269194-\$
	or US-6246784-\$ or US-
	6208749-\$ or US-6236663-\$
	or US-6205236-\$ or US-
	6181837-\$ or US-6188405-\$
	or US-6167146-\$ or US-
	6122405-\$ or US-6137898-\$
	or US-6707940-\$ or US-
	6687395-\$ or US-6701005-\$
-	
IBM_TDB	
EPO: JPO: DERWENT:	(remove\$2 or invalid\$6
USPAT; US-PGPUB;	92 ((size) same (cluster or blob)

adj means adj clustering) and EPO, JPO; DERWENT; (eye or iris or irides) and 382.clas. 4 (K?means adj clustering) or (k USPAT, US-PGPUB; adj means adj clustering) and EPO; JPO; DERWENT; 382.clas. 3 (morphological adj smooth\$5) USPAT, US-PGPUB; and face BPO; JPO; DERWENT; BM_TDB 64 (morphologic\$5 with USPAT, US-PGPUB; smooth\$5) and face and EPO; JPO; DERWENT; threshold USPAT, US-PGPUB; smooth\$5) and face and EPO; JPO; DERWENT; threshold USPAT, US-PGPUB; smooth\$5) and face and EPO; JPO; DERWENT; threshold USPAT, US-PGPUB; smooth\$5) and face and EPO; JPO; DERWENT; threshold\$5	WENT;
and mg) or (k mooth\$5) and and and	PUB; WENT; WENT; WENT; WENT; WENT; WENT; WENT; WENT;
mg) or (k mooth\$5) and	PUB; VUB; WENT; WENT; WENT; WENT; WENT; WENT; WUB; WENT;
mooth\$5) and and	WENT; WB; WENT; WENT; WENT; WENT; WB; WENT;
mooth\$5) and and	VUB; WENT; WENT; WENT; WENT; WENT; WENT;
mooth\$5) and and	VUB; WENT; WENT; VUB; WENT; WENT; VUB; WENT;
and	WENT; WENT; WENT; WENT; WENT; UB; WENT;
and	VUB; WENT; WENT; WENT; WENT; VUB; WENT;
and	WENT; WENT; WENT; WENT; WENT;
and and	WENT; WB; WENT; WENT; WENT;
and	VB; WENT; VUB; WENT;
and	VUB; VUB; VENT; VUB;
and	WENT; "UB; WENT;
and	VUB; WENT; UB;
and	VUB;
and	WENT;
	UB;
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_	_
smooth\$5) and face and EPO; JPO; DERWENT;	WENT;
threshold\$5 and mask IBM_TDB	
19 (US-6711587-\$ or US-	- An
5850470-\$ or US-5930803-\$	
or US-5412738-\$ or US-	
5859921-\$ or US-6332038-\$	
or US-6717518-\$ or US-	
6151403-\$ or US-6072892-\$	
or US-6028960-\$ or US-	
6031539-\$ or US-6181805-\$	
or US-6526161-\$ or US-	
6633655-\$).did. or (US-	
20020159627-\$ or US-	
20020118873-\$ or US-	
20020136450-\$ or US-	
20010014182-\$ or US-	
20030021448-\$).did.	

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207 (top or upper) and (bottom or USPAT; US-PGPUB; lower) and midpoint and face EPO; JPO; DERWENT; and boundary and (382.clas. IBM_TDB or 345.clas.)
adj (position or locat\$)) (mouth adj (position or t\$)) and midpoint
3 ((US-5/11987-\$ or US-590803-\$ EPO; JPGPUB; 5850470-\$ or US-5930803-\$ EPO; JPO; DERWENT; or US-5412738-\$ or US- 18M_TDB 565921-\$ or US-632203-\$ or US-6717518-\$ or US-672892-\$ or US-6728960-\$ or US-72002013867-\$ or US-72002013867-\$ or US-720030021448-\$).did.) and midpoint

	i i	
USPAT; US-PGPUB	USPAT, US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	
r; us-r	US. P. O. BO	
9 (US-6181805-\$ or US-6028960-\$ or US-6072892-\$ or US-6151403-\$ or US-6151403-\$ or US-6332038-\$ or US-671587-\$ or US-63412738-\$ or US-54930803-\$ or US-6526161-\$ or US-6526161-\$ or US-5930803-\$ or US-6526161-\$ or US-20020159627-\$ or US-20020118873-\$ or US-20020118873-\$ or US-20030021448-\$).did.	5 ((US-6181805-\$ or US-6021539-\$ or US-60218960-\$ or US-6072892-\$ or US-6151403-\$ or US-6332038-\$ or US-6332038-\$ or US-671587-\$ or US-5850470-\$ or US-5412738-\$ or US-585921-\$ or US-585921-\$ or US-585921-\$ or US-585921-\$ or US-585921-\$ or US-585921-\$ or US-20020159627-\$ or US-20020136450-\$ or US-20020114873-\$ or US-20030021448-\$).did.) and mouth	
5-60286 5-60286 5-67176 5-0 US 5-58504 5-59306 5-0 US 5-1	or US- -60286 5 or US 5 or US 5 or US 5 or US 7 or US- 7 or US- 8 or	
805-\$ c \$ or US 72892-4 \$ or US 82038-4 \$ or US 12738-4 \$ or US \$ or US \$ 1,01d. c 627-\$ c 627-\$ c 873-\$ c	805-\$ \$ or US 22892-\$ \$ or US 2738-\$ \$ or US 5 or US 5 or US 6016-\$ 6027-\$ 6027-\$ 6182-\$ 6182-\$ 6182-\$ 6182-\$ 6182-\$ 6182-\$ 627-\$ 6182-	
19 (US-6181805-\$ or US-6026 6031539-\$ or US-60216 or US-6072892-\$ or US-6717 or US-6332038-\$ or US-5717 or US-5412738-\$ or US-5850 or US-5412738-\$ or US-5930 or US-5526161-\$ or US-5020136450-\$ or US-20020136450-\$ or US-20020118873-\$ or US-20030021448-\$).did.	S-6181 31539-31539-31539-31539-31539-31539-31539-311587-3 11587-3 11587-3 100-652 33655-3 33655-3 10014 130021-118	
90 (C) 60	15 ((U) 6016 616 671 671 671 671 671 672 673 673 673 673 673 674 673 673 673 673 673 673 673 673 673 673	

USPAT; US-PGPUB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	4975969 USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB
15 (US-5412738-\$ or US- 5850470-\$ or US-6028960-\$ or US-6031539-\$ or US- 6072892-\$ or US-6151403-\$ or US-6181805-\$ or US- 6332038-\$ or US-6526161-\$ or US-6633655-\$ or US- 6711587-\$ or US-6717518- \$).did. or (US-20010014182-\$ or US-20020159627-\$ or US- 20030021448-\$).did.	9 ((US:5412738-\$ or US-5850470-\$ or US-6028960-\$ or US-6031539-\$ or US-6072892-\$ or US-6151403-\$ or US-6181805-\$ or US-6181805-\$ or US-633038-\$ or US-653655-\$ or US-6711587-\$ or US-20010014182-\$ or US-20020159627-\$ or US-20030021448-\$).did.) and ratio	53 ratio same mouth same eye and (382.clas. or 345.clas.)	98 4975969 0	2 4975969.pn.		20 ((mouth near4 (size or length)) to same (eye)) and (382.clas. 10.345.clas.)
					44,	

USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB
3 ((relative near size) with mouth) same eye and (382.clas. or 345.clas.)	3 ((relative near size) with mouth) same eye	90 ratio same mouth same eye

US- USPAT; US-PGPUB; 5542625-\$ JPO; DERWENT or US- 5241669-\$ or US- 5108437-\$ or US- 5570434-\$ or US- 557043-\$ o																																				
US- 5542625-\$ 524169-\$ 524169-\$ 524169-\$ 5108437-\$ 5108437-\$ 5213333-\$ 5213333-\$ 5270434-\$ 5270434-\$ 5270434-\$ 5770165-\$ 5770165-\$ 5770165-\$ 5770165-\$ 5770165-\$ 5770165-\$ 5770165-\$ 5770165-\$ 5770165-\$ 5770165-\$ 5770165-\$ 5770165-\$ 5770165-\$ 5770165-\$ 577016-\$ 5770165-\$ 5770165-\$ 5770165-\$ 5770165-\$ 5770165-\$ 5770165-\$ 577016148-																																			IPO DERWENT	I ISDAT: IIS POPIIR
90 (US-6594629-\$ or US-6542625-\$ or US-659629-\$ or US-6542625-\$ or US-6241669-\$ or US-6219640-\$ or US-619840-\$ or US-619840-\$ or US-619840-\$ or US-612839-\$ or US-6035032-\$ or US-6035032-\$ or US-5008946-\$ or US-521333-\$ or US-5224173-\$ or US-5308946-\$ or US-521333-\$ or US-5224173-\$ or US-5224173-\$ or US-5224173-\$ or US-5224173-\$ or US-5224163-\$ or US-5224173-\$ or US-5224163-\$ or US-5224163-\$ or US-5224163-\$ or US-523955-\$ or US-573539-\$).did. or (US-573539-\$).did. or (US-573539-\$).did. or (US-5805745-\$ or US-5805745-\$ or US-693500-\$ or US-683915-\$ or US-693900-\$ or US-683915-\$ or US-693900-\$ or US-683900-\$ or US-683900-\$ or US-693900-\$ or US-693900-\$ or US-693500-\$ or US-693500-\$ or US-693500-\$ or US-693500-\$ or US-693500-\$ or US-693500-\$ or US-693000-\$ or US-6930000-\$ or US-693000-\$ or US-50030000000-\$ or US-20030000000000000000000000000000000000	20030223622-\$ or US- 20030222891-\$ or US-	20040011496-\$ or US- 20030223622-\$ or US-	20040027352-\$ or US-	20040041804-\$ or US-	20040062423-\$ or US-	or US-20030169906-\$ or US-	\$).did. or (US-20030193582-\$	6657628-\$ or US-6016148-	or US-6697502-\$ or US-	5926575-\$ or US-6009210-\$	or US-5867588-\$ or US-	6639600-\$ or US-5850463-\$	or US-6638073-\$ or US-	6332038-\$ or US-6321108-\$	or US-6389155-\$ or US-	or US-5835616-\$ or US-	5808624-\$ or US-5828413-\$	or US-5805745-\$ or US-	5763102-\$ or US-5781650-\$	5733539-\$).did. or (US-	or US-5710590-\$ or US-	6611613-\$ or US-5679541-\$	or US-6623937-\$ or US-	5659625-\$ or US-6633655-\$	07 US-5625704-\$ or US-	or US-5224173-\$ or US-	5008946-\$ or US-5213333-\$	or US-4975969-\$ or US-	6031539-\$ or US-4692125-\$	or US-6055032-\$ or US-	6128398-\$ or US-6108437-\$	or US-6219640-\$ or US-	6251525-\$ or US-6241669-\$	or US-6496594-\$ or US-	6567775-\$ or US-65426-\$	90/11S-6594629-\$ or 11S-

or US-6611613-\$ or US- 6542625-\$ or US-6496594-\$
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37	37 (ratio same mouth same eye)	USPAT; US-PGPUB;			
	and (not ((US-49/3969-\$ of US-5024173	EPO, JPO, DERWENT,			
	\$ or US-5570434-\$ or US-				
	5808624-\$ or US-5828413-\$		-		
	or US-5835616-\$ or US-				
	5850463-\$ or US-5867588-\$				
	or US-5926575-\$ or US-			-	
	6009210-\$ or US-6697502-\$				
	or US-6657628-\$ or US-				
	6639600-\$ or US-6633655-\$				
	or US-6611613-\$ or US-				
	6542625-\$ or US-6496594-\$		_		
	or US-6492990-\$ or US-				
	6389155-\$ or US-5625704-\$				
	or US-5659625-\$ or US-				-
	5781650-\$ or US-5805745-\$				
	or US-6332038-\$ or US-				
	6128398-\$).did. or (US-				
	6108437-\$ or US-6031539-\$				
	or US-6016148-\$).did. or (US-				
	20040041804-\$ or US-				
	20040027352-\$ or US-				
	20030223622-\$ or US-				
	20030222891-\$ or US-				
	20030198368-\$ or US-				
	20020176609-\$ or US-				
	20020135618-\$ or US-				-
	20020076100-\$ or US-				
	20020033825-\$ or US-				
	20020031262-\$ or US-				
	20020018595-\$ or US-				
	20020009214-\$ or US-				
	20010031073-\$ or US-				
	20010014182-\$ or US-				
	20030169906-\$ or US-				
	20030165270-\$ or US-				
	20030165269-\$ or US-				
	-500 10 e-750 10 00-7				

USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB	US-PGPUB	USPAT; US-PGPUB; EPO: JPO: DERWENT:	IBM_TDB	USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM_TDB
90-\$ 10-\$ 10-\$ 10-\$ 10-\$ 10-\$ 10-\$ 10-\$ 1		1 (((bottom or lower) with (section or half or halves))		1 (middle or midpoint) and ((US- USPAT; US-PGPUB; 20010014182-\$).did.) EPO; JPO; DERWEN IBM_TDB
rs				-

EAST SEARCH TAGGED	H TAGGED					
patent #	type	pub date	title	class1	class2	inventor
US 20030021448 A1	US-PGPUB	20030130	20030130 Method for detecting eye and mouth positions in a digital image	382/117	382/165	Chen, Shoupu et al.
US 20010014182 A1	US-PGPUB	20010816	20010816 IMAGE PROCESSING APPARATUS	382/282		FUNAYAMA, RYUJI et al.
US 6633655 B1	USPAT	20031014	20031014 Method of and apparatus for 382/118 detecting a human face and observer tracking display	382/118	382/164; 382/165; 382/174; 382/206	Hong, Qi He et al.
US 6526161 B1	USPAT	20030225	20030225 System and method for biometrics-based facial feature extraction	382/118	382/154; 382/199	Yan, Yong
US 6181805 B1	USPAT	20010130	20010130 Object image detecting method and system	382/118		Koike, Hideki et al.
US 6031539 A	USPAT	20000229 Facial appara autom face o toolo	image method and atus for semi- atically mapping a n to a wireframe gy	345/419		Kang, Sing Bing et al.
US 6028960 A	USPAT	20000222	20000222 Face feature analysis for sutomatic lipreading and character animation	382/203	382/100; 382/118; 382/165	Graf, Hans Peter et al.
US 6072892 A	USPAT	20000606	20000606 Eye position detecting apparatus and method therefor	382/117	382/118	Kim, Seong-Beom
US 6151403 A	USPAT	20001121	20001121 Method for automatic detection of human eyes in digital images	382/117	382/118; 382/209; 382/219; 382/274; 382/308	Luo, Jiebo
US 6717518 B1	USPAT	20040406	20040406 Method and apparatus for Getection of drowsiness	340/576	348/143; 382/117	Pirim, Patrick et al.

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Funayama, Ryuji et al.	Dufaux, Frederic	Schneiderman, Henry et al.	Kung, Sun-Yuan et al.	Brunelli, Roberto et al.	Chen, Tong-Xian et al.	Suzuki, Hiroyoshi	Becker, Barry G. et al.	Tran, Don et al.
348/135; 348/169; 348/171; 382/103; 382/107; 382/118; 382/203; 382/205; 382/286; 382/288; 382/298	9/202		382/116; 382/117; 382/118; 382/159; 706/20; 706/25	382/209; 704/231; 704/235; 704/246		382/171; 382/173; Suzuki, Hiroyoshi 382/257	345/804; 707/100	
382/190	707/104.1	382/154	382/157	382/115	382/165	382/118	707/104.1	382/143
mage processing device	20040323 Keyframe selection to represent a video	20021031 Object finder for photographic images	19981215 Neural network for locating and recognizing a deformable object	19950502 Recognition system, particularly for recognising people	20020926 Red-eye detection based on 382/165 red region detection with eye confirmation	19990112 Apparatus for processing an 382/118 image of a face	19990727 Method, system, and computer program product for visualizing an evidence classifier	20020829 Machine vision-based singulation verification system and method
20011218 Image	20040323	20021031	199812151	19950502	20020926	19990112 /	19990727	20020829
USPAT	USPAT	US-PGPUB	USPAT	USPAT	US-PGPUB	USPAT	USPAT	US-PGPUB
US 6332038 B1	US 6711587 B1	US 20020159627 A1	US 5850470 A	US 5412738 A	US 20020136450 A1	US 5859921 A	US 5930803 A	US 20020118873 A1